Figure 1: The Customer Design System (CDS) 43638

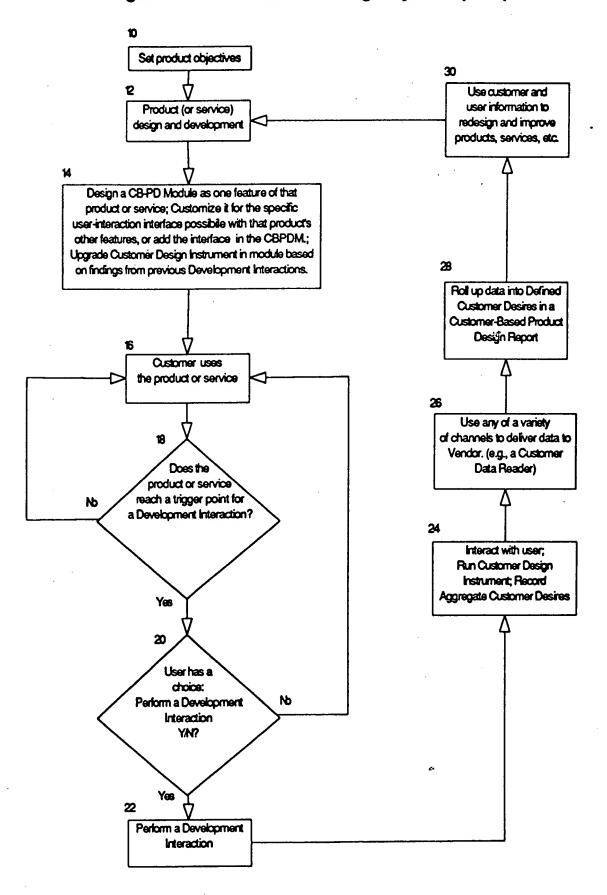


Figure 2: Customer-Based Product Design Module (CB-PDM)

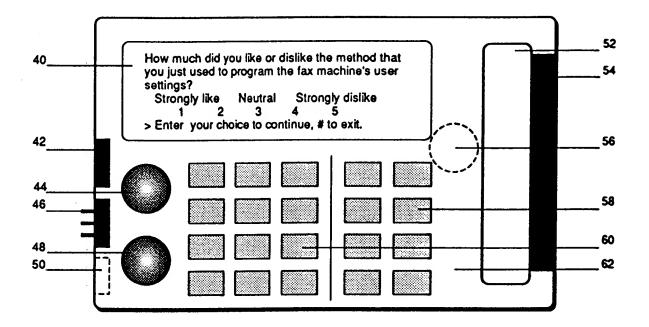


Figure 3: Customer Directed Product (CDP)

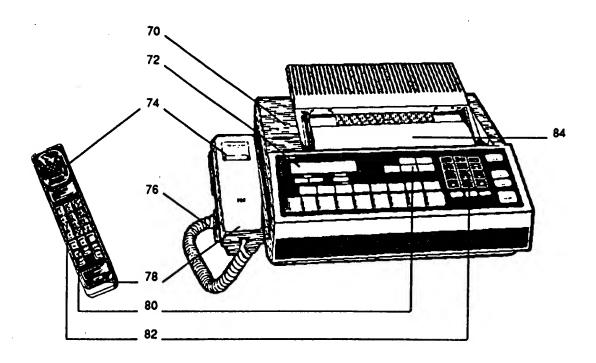


Figure 4: Customer Data Reader/Programmer (CDRP) 243638

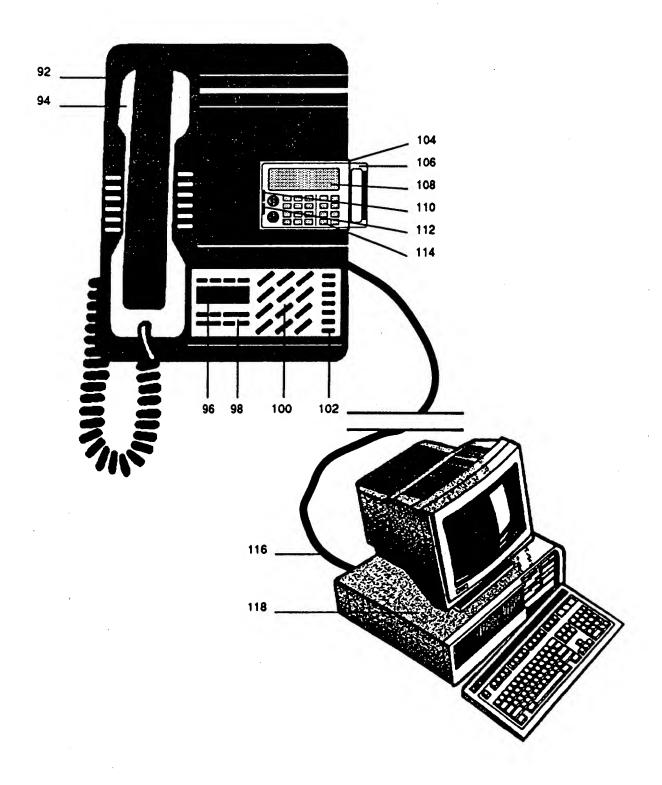


Figure 5: Transmitting ACD data to Vendor directly from a CB-PD Module

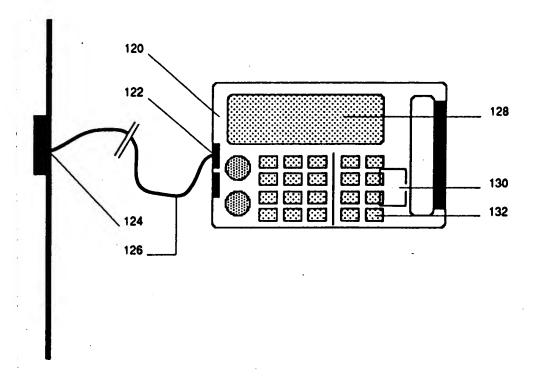


Figure 6: Block diagram of CB-PD Module

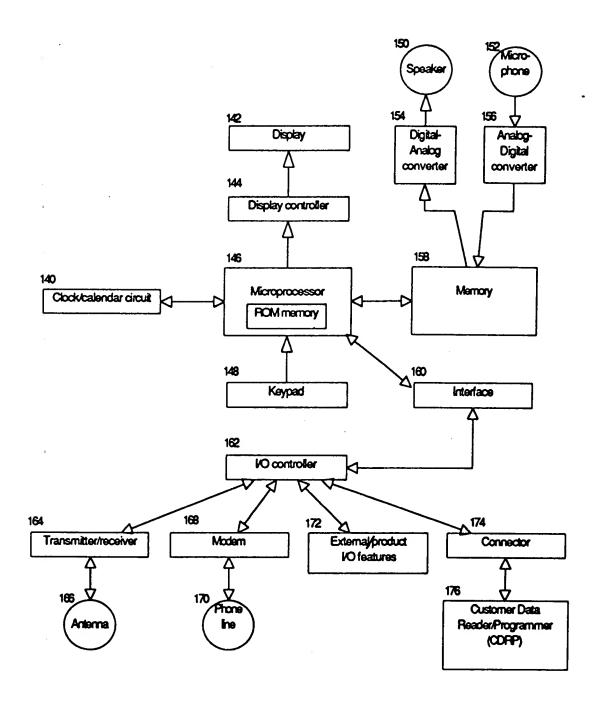


Figure 7: Block diagram of Customer Directed Product (CDP)  $\frac{18/243638}{1}$ 

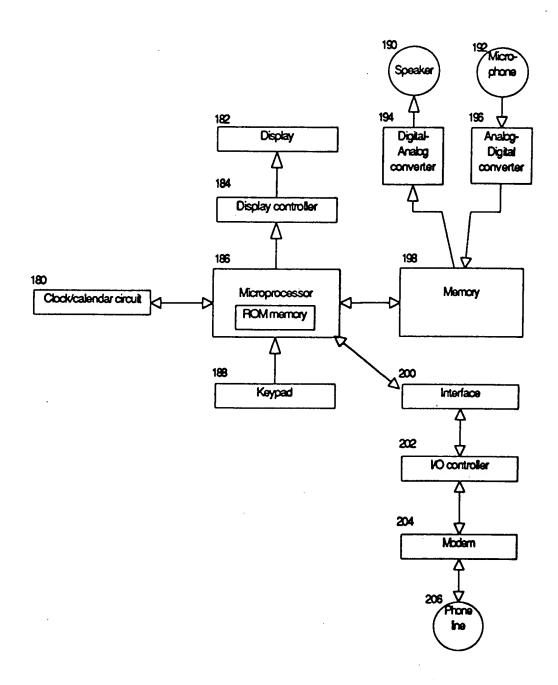


Figure 8: Instrument Design Repository (IDR)

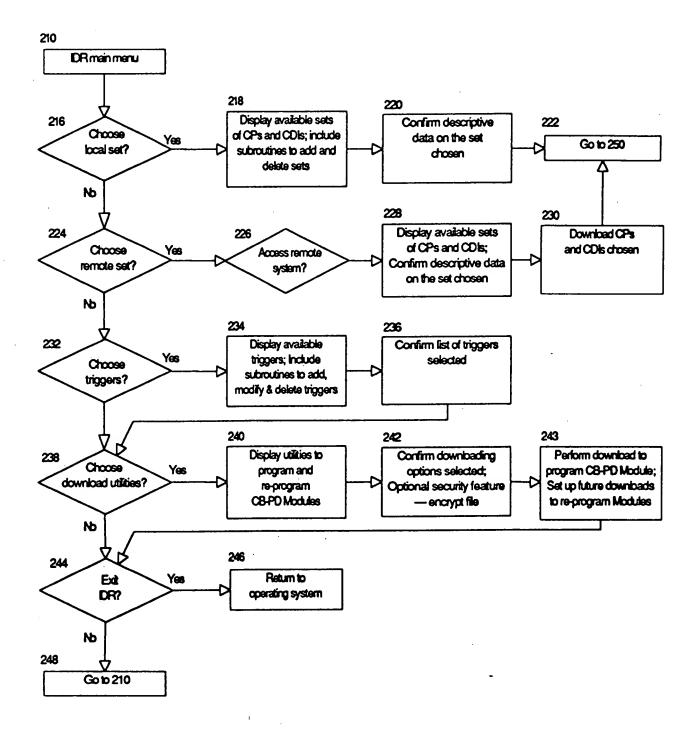
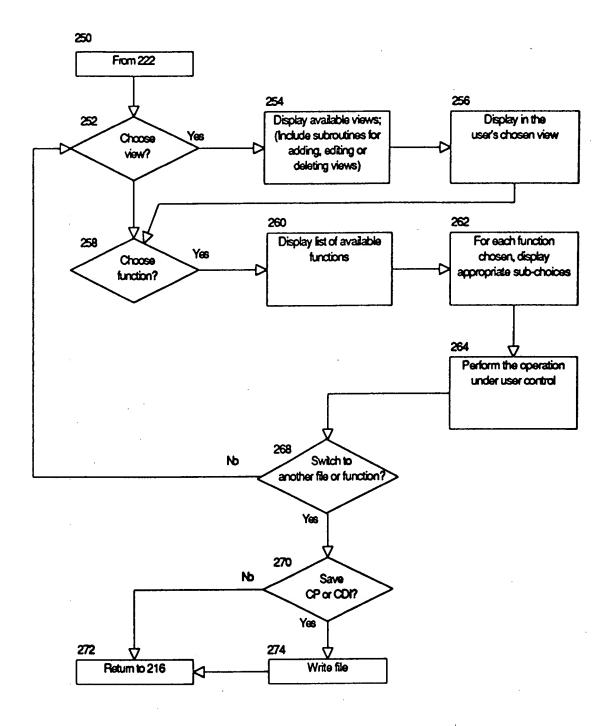


Figure 9: Instrument Design Repository (IDR)



280 Recognizable use of product or service 284 Read CDI (decrypt if 282 286 encrypted); Display menu for Match Yes Second that DI (include language option); trigger? language chosen? Signal Customer I needed; 287 Read Customer input device М Write record 290 Set language flag Ю Request to run COls in participation? that language 292 М 291 Read product input; Bead inggers 293 Evaluate input; Write o transmit date to Probe? data record; Encrypt Vendor answer (optional) Nò 296 294 Read customer input; Yes **Probe** Receive answer, (next or previous) Error check М 300 Edit error present? Entor message command? Yes М 304 User exits Development Encrypt answer (optional); Interaction; Display Write answer record thank you message 306 Display thank you Last message Probe? М Yes 312 Yes М transmission to Go to 320 Vendor

Figure 10: Development Interactions (DI)

Figure 11: Transmission with Optional Security Procedures 43638

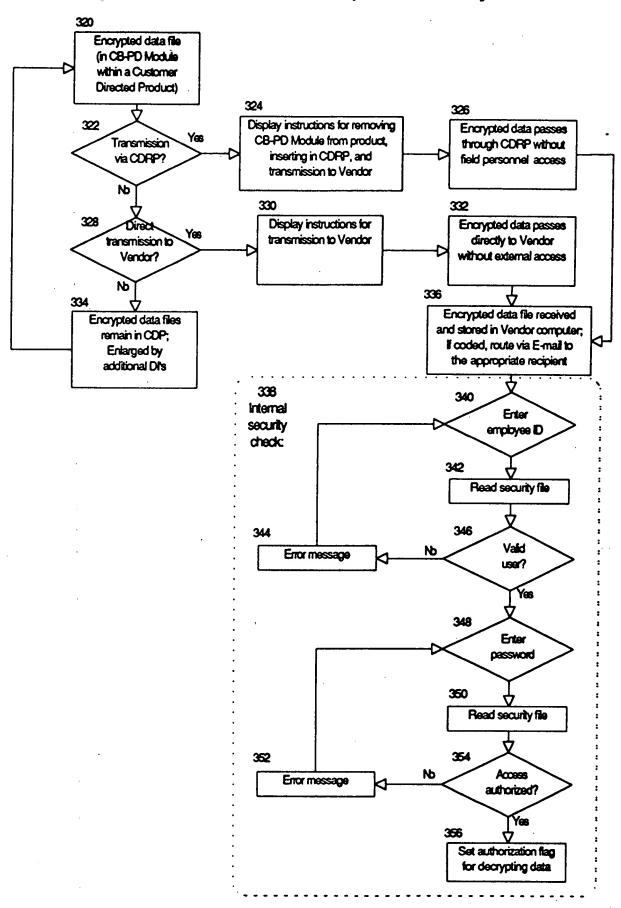


Figure 12: Growth of Aggregate Customer Desires (ACD) Database

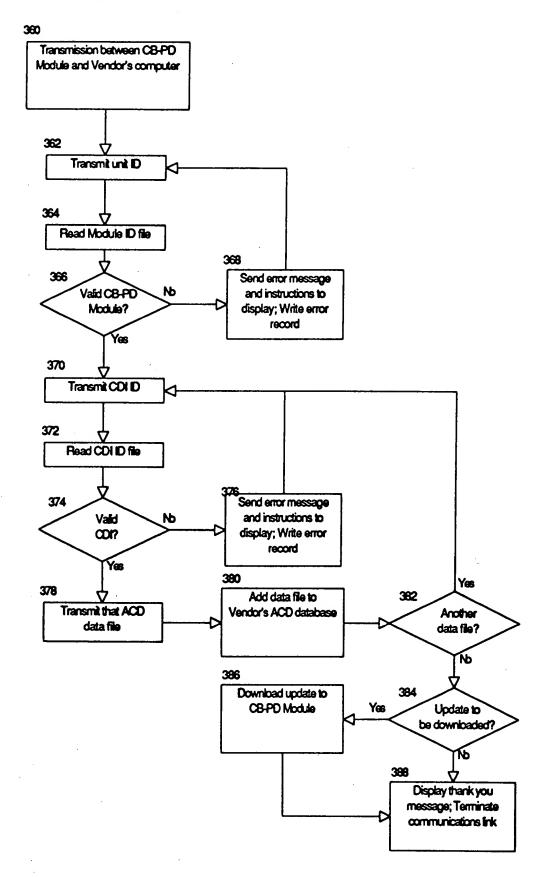
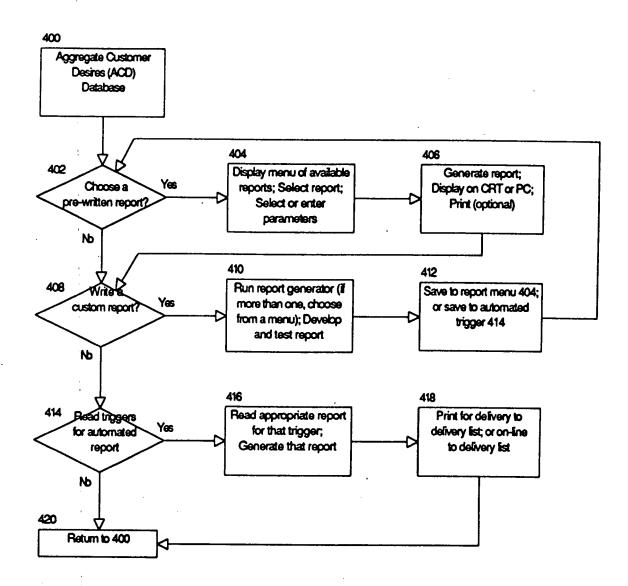


Figure 13: Customer-Based Product Design Report (CB-PDR)



## Figure 14: Recommended reporting format for Customer-Based Product Design Reports (CB-PDR)

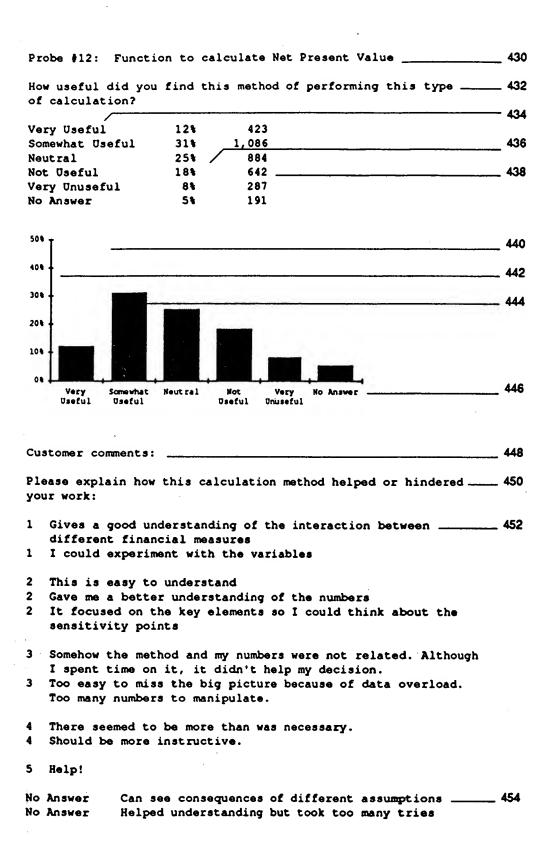
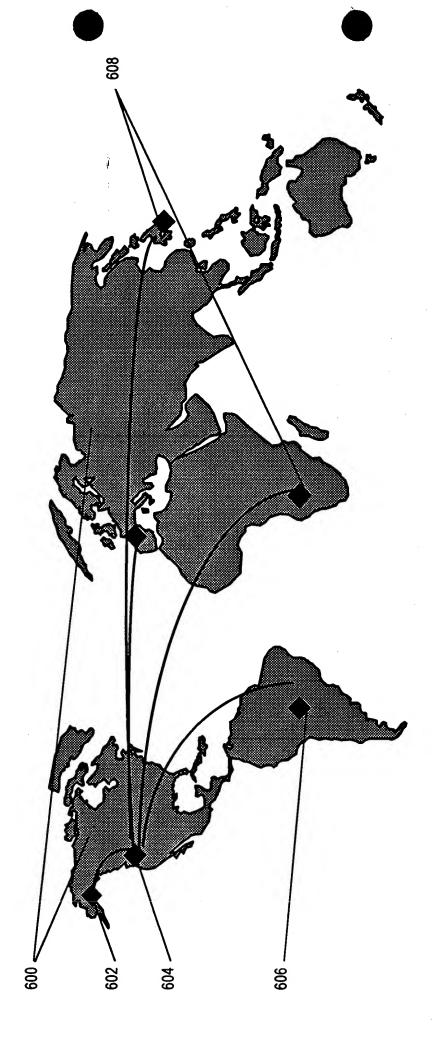


Figure 15



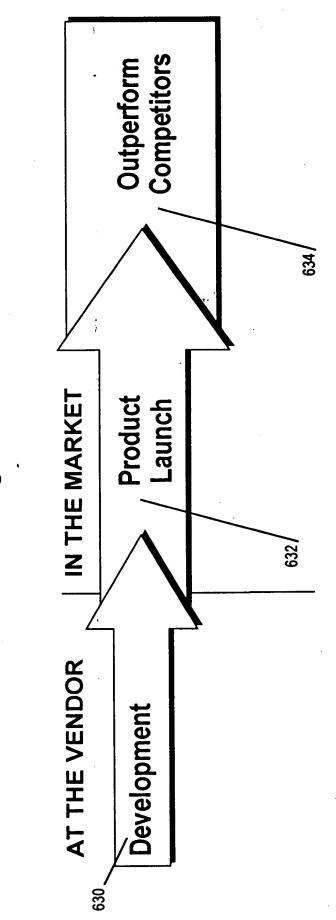
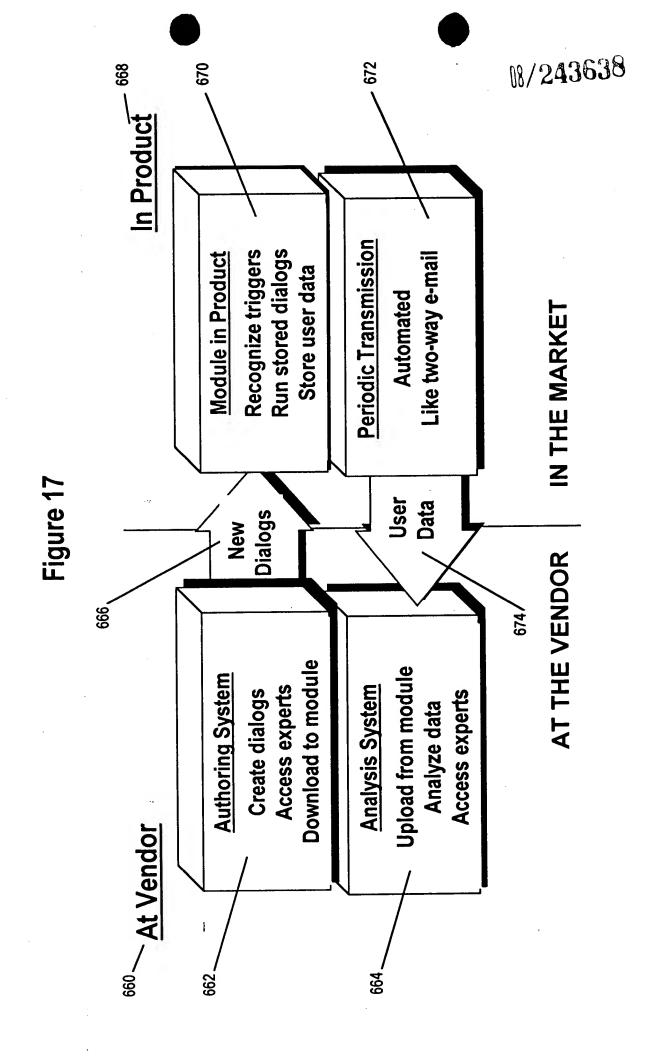
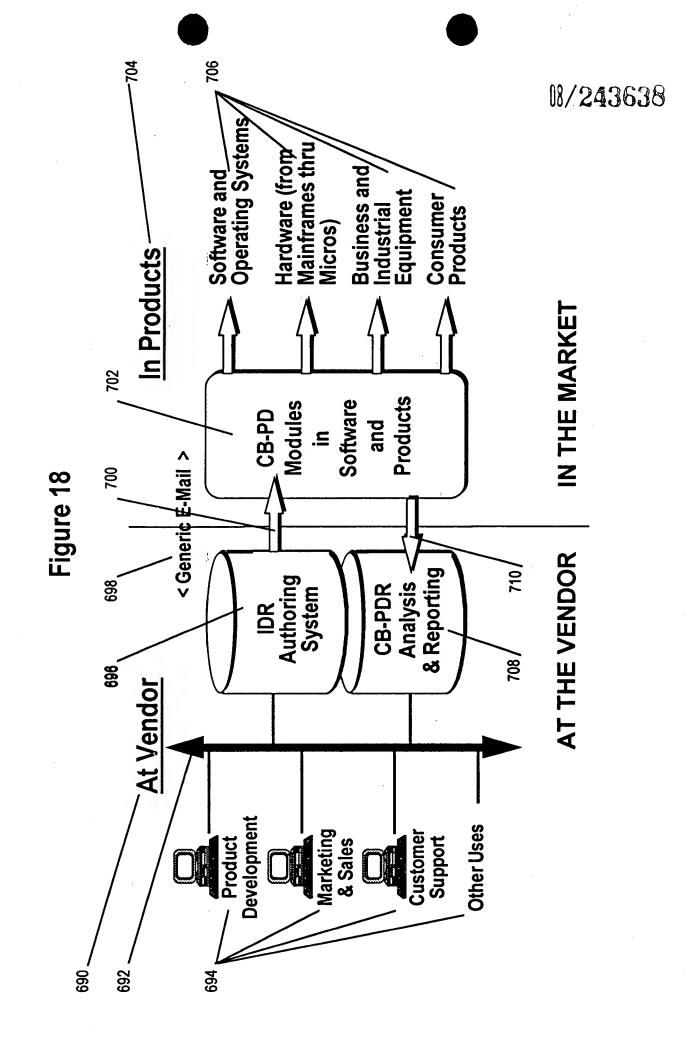
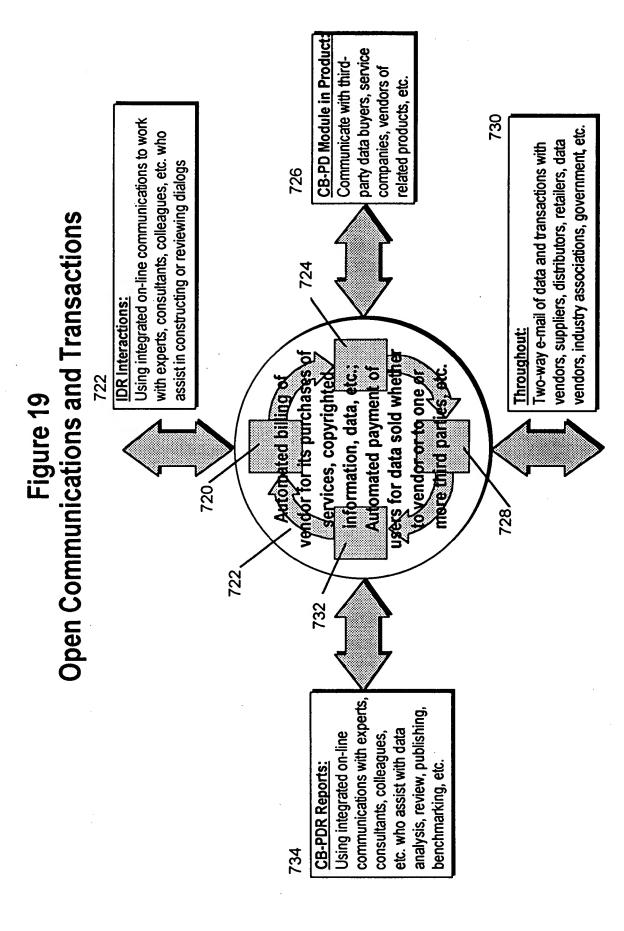
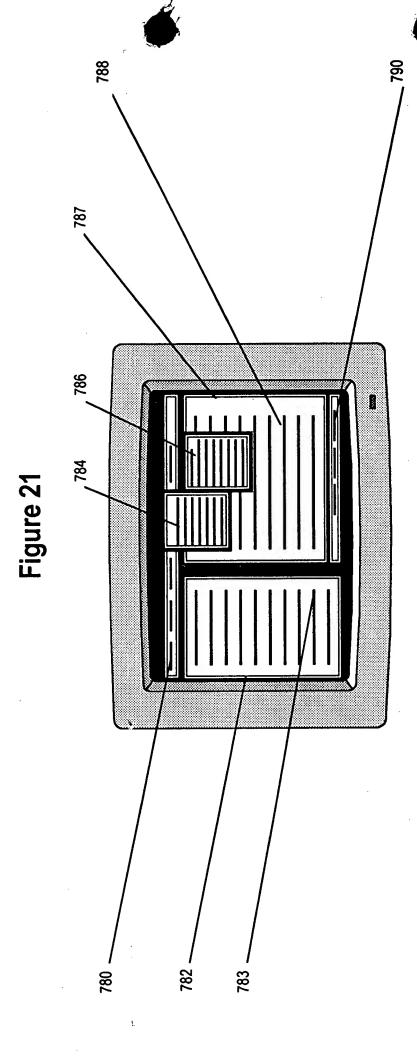


Figure 16



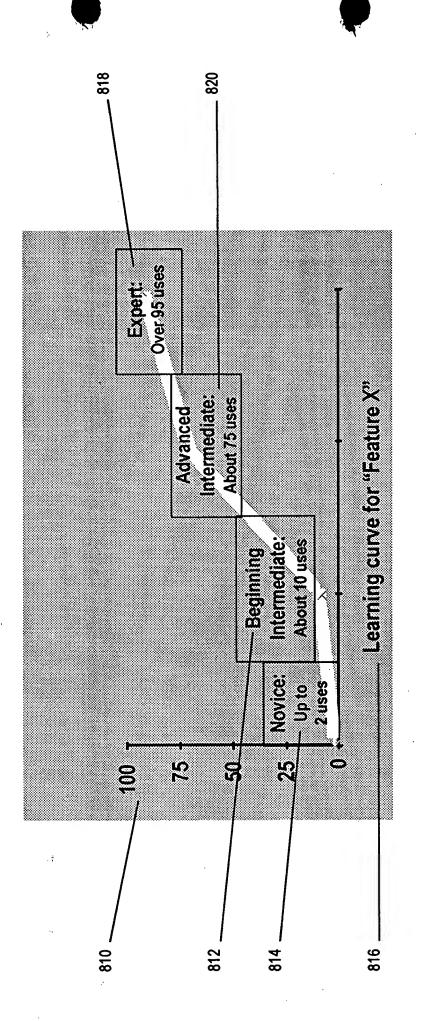






AT THE VENDOR

Figure 22



## FIGURE 23

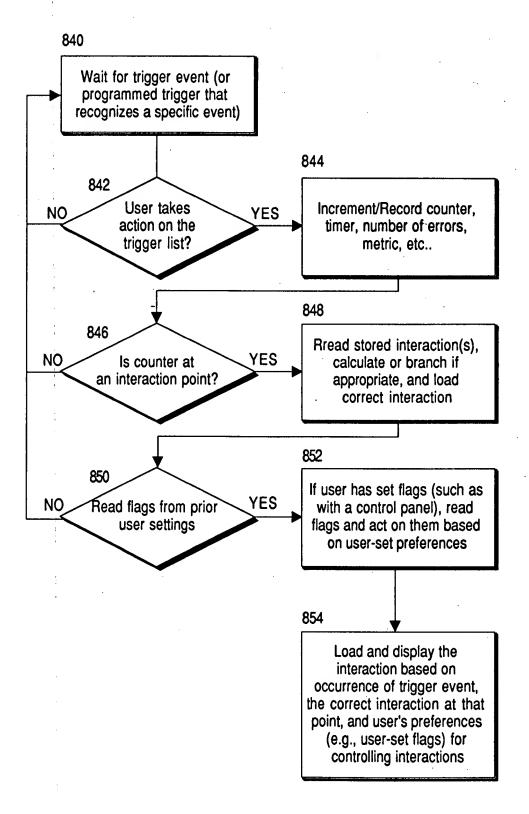


Figure 24

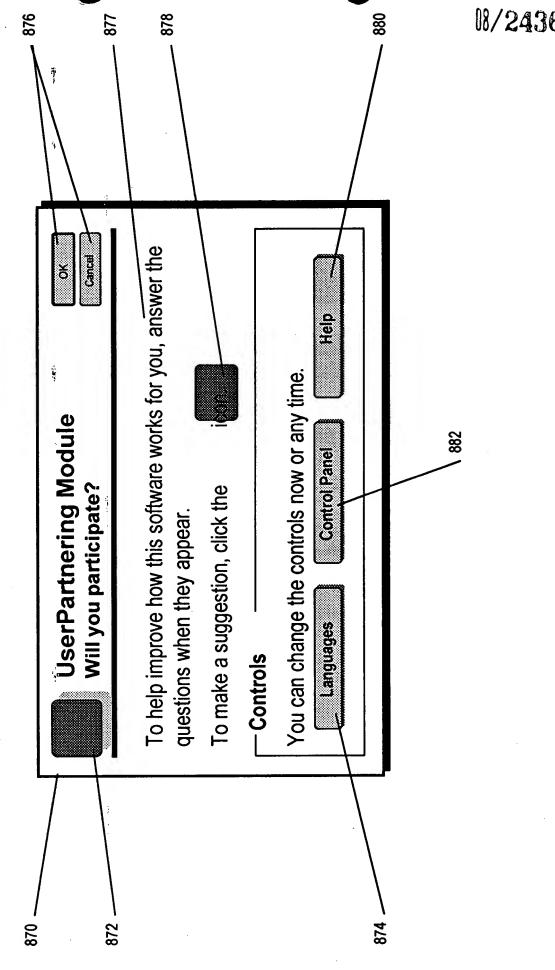


Figure 25

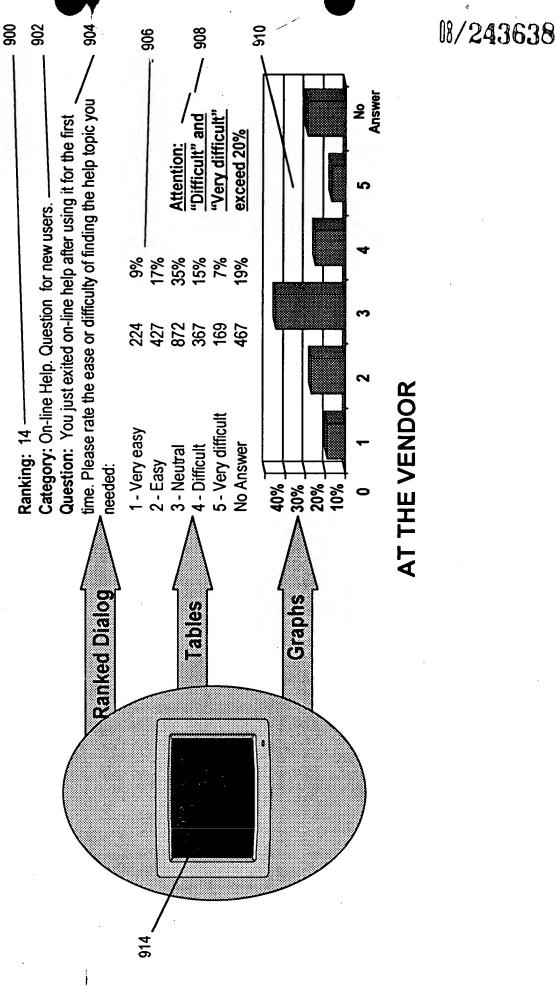


Figure 26

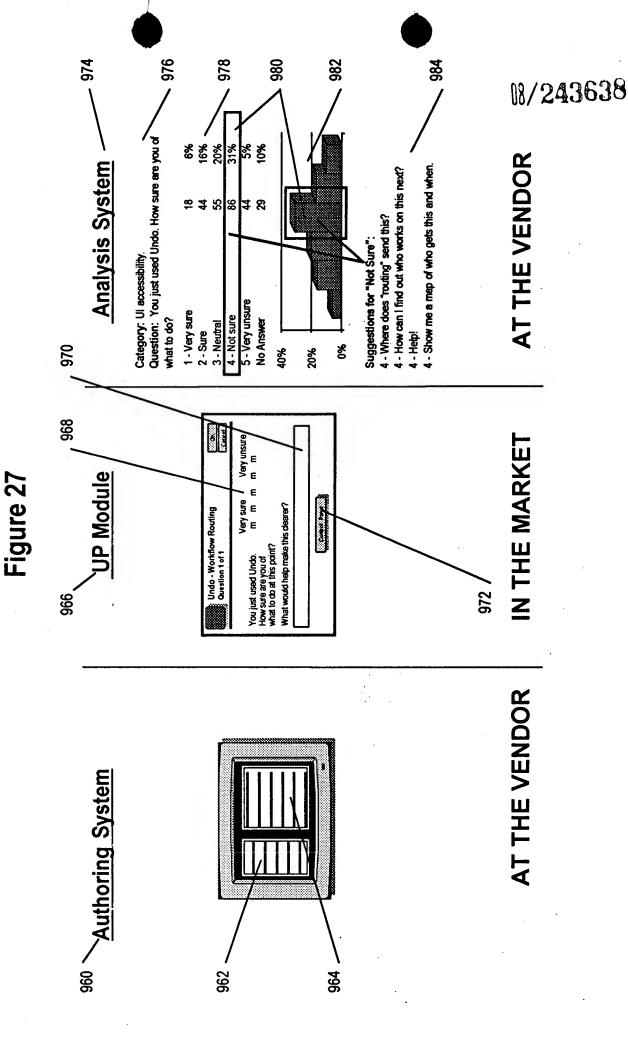
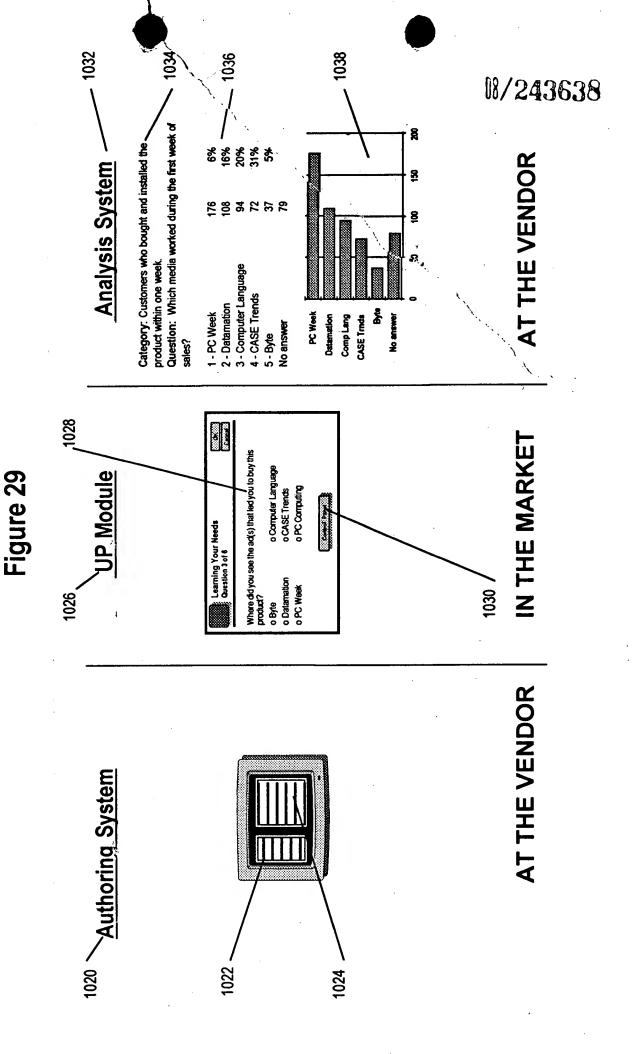
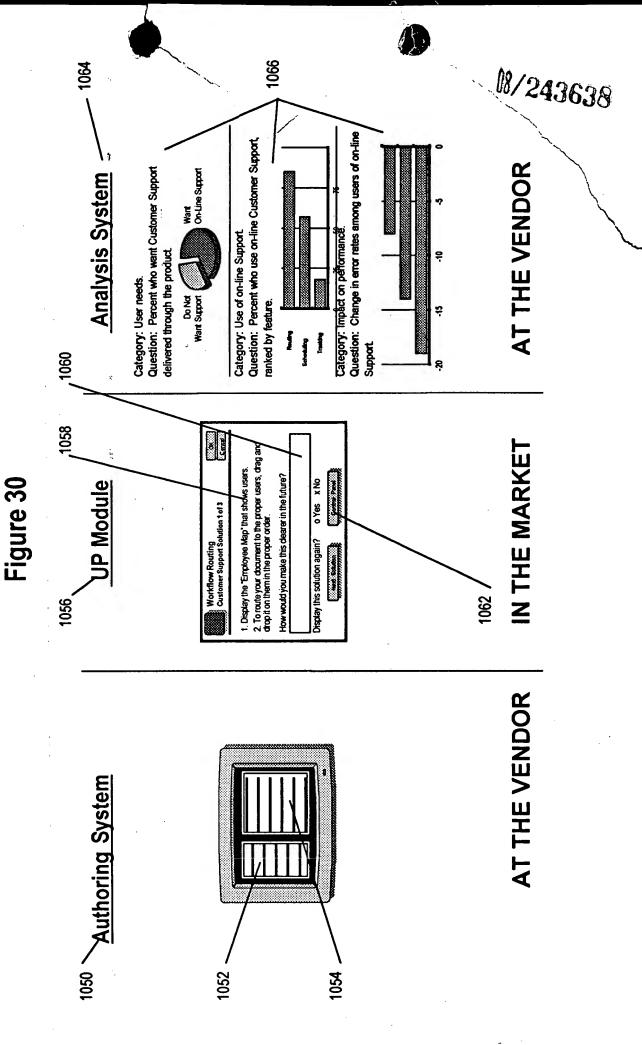


Figure 28

|                    | Authoring System   | UP Module  | Analysis System  |          |
|--------------------|--|--|--|----------|
| Week 1             | Trigger Examples: •User problems •User successes •User questions | Dialogs: •Understand terms? •Know what to do? •The right features? | Findings: •Know what works •Learn the problems •Start fixes early  |          |
| 994 Week 2         | Trigger Examples; •Unusued features •Unanswered UI questions     | Dialogs: •Try this feature •Help us figure out this problem        | Findings: •Why features are not used/ •Interpret problems          |          |
| Week n through end | Trigger Examples: •Known problems •Productivity •Performance     | Dialogs: •Which UI solution do you want? •How to improve it?       | Findings: *Choose Ul designs *How to make users better and happier |          |
| 866                | <b>A</b>   |  |  | 18/24363 |







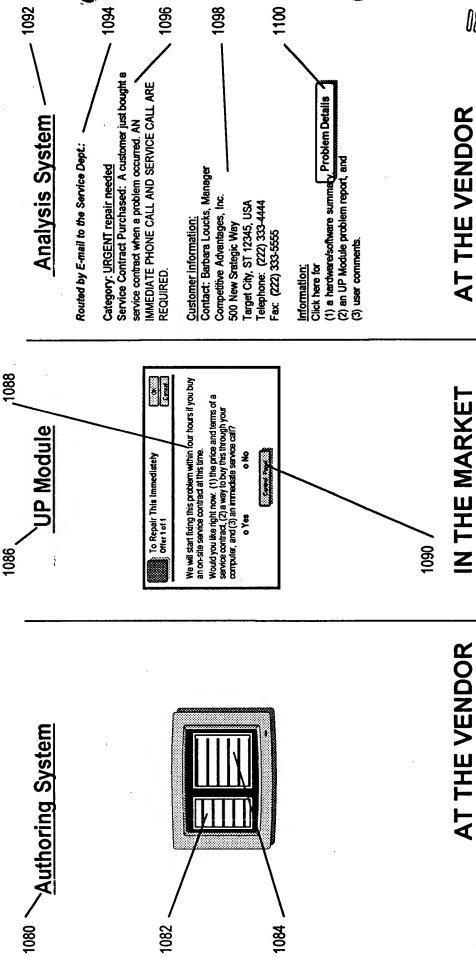
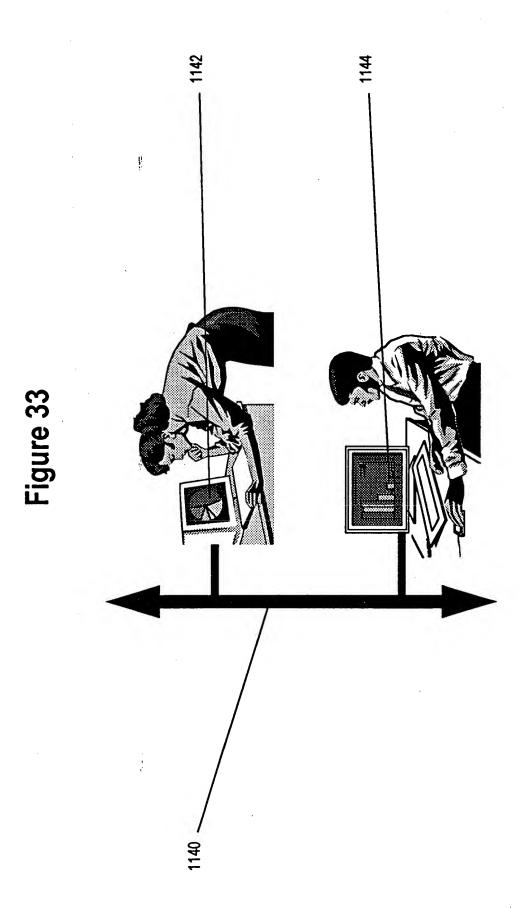


Figure 32

| 1110                   | Authoring System  | UP Module  | Analysis System 1120   |
|------------------------|---|--|--|
| Current Situation      | Trigger Examples: •Trends •Shifts •Deviations                       | <u>Dialogs:</u> •How to improve? •Is something new? •Is it unexpected? | Findings: •Quick problem identification •Immediate learning  |
| Next 1114 Situation    | Trigger Examples: •Cycle time •Turn times •Costs                    | Dialogs: How to •Do it faster? •Do it better? •Reduce costs?           | Findings: •Faster performance •Improved quality •Lower costs |
| Continuous Improvement | Trigger Examples: •Specific tasks •Steps in the tasks •Productivity | Dialogs: •Improve the task? •Cut out steps? •Reorganize work?          | Findings: •Work smarter •More productively •Improve faster   |



## FIGURE 34A

